

Amendment to the Claims

The following listing of claims will replace all prior versions, and listing, of claims in the application.

Listing of Claims:

1. (Currently amended) Dosage feed device for the dosage feed of an additive fluid, the dosage feed device comprising:

a dosing element, which can be adjusted by an adjustment device;

the dosing element including a dosing gap and a valve device arranged following the dosing gap in a direction of fluid flow of the additive fluid, the valve device having an open and a closed position;

the dosing gap being formed between inner and outer members movable relative to one another by the adjustment device; and

the valve device being movable from the closed position to the open position without adjusting the dosing gap and one of the inner or outer members being movable from a flow position to an adjustment flow position adjusting flow through the dosing gap.

2. (Previously presented) Dosage feed device according to claim 1, wherein a flow area of the dosing gap is variable, whereby the flow area increases with movement of the inner member relative to the outer member in the direction of fluid flow of the additive fluid.

3. (Currently amended) Dosage feed device according to claim 1, wherein the inner member is a dosing cone and the outer member is a counter element, whereby the dosing cone is moveable relative to the counter element in the direction of fluid flow of the additive fluid to increase a flow area of the dosing gap upon the valve device moving from the open position to the adjustment flow position.

4. (Previously presented) Dosage feed device for the dosage feed of an additive fluid, the dosage feed device comprising:

a dosing element, which can be adjusted by an adjustment device, and

the dosing element including a dosing gap and a valve device arranged following the dosing gap in direction of fluid flow of the additive fluid;

wherein the dosing gap is formed between a dosing cone and counter element, whereby the dosing cone and counter element are movable relative to one another; and

wherein the dosing cone is formed as the end section of a displaceable sleeve, the said end section appearing conical in the direction of fluid flow, whereby at least the end section is arranged for displacement in a guide sleeve as the counter element.

5. (Previously presented) Dosage feed device according to claim 1, wherein the dosing gap is an annular area around the dosing cone which changes in size as the dosing cone moves relative to the valve device.
6. (Previously presented) Dosage feed device according to claim 4, wherein a guide section of the displaceable sleeve is supported for displacement in a support sleeve between an extended position and a withdrawn position.
7. (Previously presented) Dosage feed device according to claim 6, wherein the displaceable sleeve is subject to spring pressure in the direction of the withdrawn position.
8. (Previously presented) Dosage feed device according to claim 6, wherein an especially annular stop protrudes radially outwards from the displaceable sleeve for defining the withdrawn position on the support sleeve.
9. (Previously presented) Dosage feed device according to claim 6, wherein a compression spring is arranged between the support sleeve and a first sleeve end of the displaceable sleeve.
10. (Previously presented) Dosage feed device according to claim 9, wherein a support ring is arranged on the first sleeve end.

11. (Previously presented) Dosage feed device according to claim 4, wherein a valve-seat sleeve is arranged between the valve device and the dosing gap in a flow channel, on which a valve element of the valve device contacts on one side in a valve-closed position.
12. (Previously presented) Dosage feed device according to claim 11, wherein the valve device is a non-return valve which is subject to spring pressure in the direction of the valve-seat sleeve.
13. (Previously presented) Dosage feed device according to claim 11, wherein the valve element is a spherical valve element that contacts an opening edge of the valve-seat sleeve, sealed tightly against fluids, in the valve-closed position.
14. (Previously presented) Dosage feed device according to claim 11, wherein a spacer sleeve is arranged between the valve-seat sleeve and the guide sleeve.
15. (Previously presented) Dosage feed device according to claim 11, wherein the valve element is arranged in a cup-shaped element receptacle, between which and an inner side of a housing hole at least one fluid opening is formed.
16. (Previously presented) Dosage feed device according to claim 4, wherein the dosing gap includes a certain opening area in a withdrawn position of the displaceable sleeve.
17. (Previously presented) Dosage feed device according to claim 14, wherein an actuating plunger is supported for displacement within the displaceable sleeve, spacer sleeve and valve-seat sleeve, which is in contact with the valve element at its support end.
18. (Previously presented) Dosage feed device according to claim 17, wherein the actuating plunger is movably connected to the adjustment device with its moving end remote from its support end.

19. (Previously presented) Dosage feed device according to claim 18, wherein the movable end protrudes by a certain delay length out of the first sleeve end of the displaceable sleeve.
20. (Previously presented) Dosage feed device according to claim 9, wherein at least one additive fluid guide opens into an annular space of a flow channel between the guide sleeve and the support sleeve.
21. (Previously presented) Dosage feed device according to claim 20, wherein at least one connecting hole penetrates the support sleeve in the direction of the first sleeve end from the annular space.
22. (Previously presented) Dosage feed device according to claim 1, wherein the adjustment device exhibits at least a spindle drive, a reduction gear, a helically toothed spur gear and a drive motor.
23. (Previously presented) Dosage feed device according to claim 22, wherein the spindle drive exhibits a rotatable, but axially undisplaceable spindle nut and a rotationally rigid, but axially displaceable threaded spindle.
24. (Previously presented) Dosage feed device according to claim 23, wherein a code carrier of a position sensor is assigned to the threaded spindle.
25. (Previously presented) Dosage feed device according to claim 1, wherein a device housing includes two or more insertion bevels on the outer side of its housing and an inlet for the additive fluid positioned therebetween.
26. (Previously presented) A dosage feed device for the dosage feed of an additive fluid, the dosage feed device comprising:
 - a valve device adjustable by an adjustment device to an open position;

a dosing cone forming a dosing gap with a counter element, the valve device being arranged following the dosing cone in a direction of fluid flow of the additive fluid;

the valve device being adjustable by the adjustment device as the valve device moves to an open position without moving the dosing cone relative to the counter element; and

the adjustment device moving the dosing cone to an adjustment position adjusting the dosing gap after the valve device has first moved to the open position.